

# County of Alleghany

Alleghany County Governmental Complex · 9212 Winterberry Avenue · Covington, VA 24426

Administration  
540/863-6600  
Fax: 540/863-6606

Central Accounting  
540/863-6610  
Fax: 540/863-6611



Parks & Recreation  
540/863-6622  
Fax: 540/863-6620

Public Works  
540/863-6650  
Fax: 540/863-6655

## LETTER OF TRANSMITTAL

**DATE:** March 30, 2011

**TO:** Mr. Lewis J. Pillis, PE  
Water Permit Writer  
Virginia DEQ  
3019 Peters Creek Road  
Roanoke, Virginia 24019

**FROM:** Mr. Christopher B. Clark, PE *CBC*  
Alleghany County – Department of Public Works  
Director of Public Works  
9212 Winterberry Avenue, Suite C  
Covington, Virginia 24426

**RE:** VPDES Permit #VA0090671 Renewal 2<sup>nd</sup> Submission  
Lower Jackson River Regional WWTP

---

<u>No. of Copies</u>	<u>Description</u>
1	VPDES Permit Number VA0090671 – Lower Jackson River Regional WWTP Permit Renewal Application
1	Memo to Mr. Lewis J. Pills, PE
1	Seven map exhibits for the LJRRWWTP
1	Toxicity Summary Table for Part E of Form 2A
1	VPDES Sewage Sludge Permit Application Form

---

Copy to: VDH-OWP, 131 Walker Street, Lexington, Virginia 24450 (Enclosure)  
Mr. John Strutner – County Administrator (Enclosure)  
Mr. Jon Lanford – Assistant County Administrator (Enclosure)  
Mr. Gary Hepler – Deputy Director of Public Works (Enclosure)  
Mr. Joe Hogan – Chief Operator, LMWWTP (Enclosure)  
Mr. Don Hearl – ESS (Enclosure)  
Mr. Brian White – ESS (Enclosure)  
File (Enclosure)

John R. Strutner, County Administrator

---

BOARD OF SUPERVISORS

David P. Price  
Boiling Springs District

Suzanne T. Adcock  
Clifton Forge East District

Carolyn T. Barnette  
Clifton Forge West District

Paige R. Morgan  
Covington District

Rickey D. May  
Falling Spring District

1 of 1

Stephen A. Bennett  
Jackson River District

Cletus W. Nicely  
Sharon District

# County of Allegheny

Allegheny County Governmental Complex

9212 Winterberry Avenue

Covington, VA 24426

Administration  
540/863-6600  
Fax: 540/863-6606

Central Accounting  
540/863-6610  
Fax: 540/863-6611



Parks & Recreation  
540/863-6622  
Fax: 540/863-6620

Public Works  
540/863-6650  
Fax: 540/863-6655

## MEMORANDUM

**DATE:** March 30, 2011

**TO:** Mr. Lewis J. Pillis, PE – Water Permit Writer

**FROM:** Mr. Christopher B. Clark, PE – Director of Public Works *CBC*

**RE:** VPDES Permit #VA0090671 Renewal - 2<sup>nd</sup> Submission  
Lower Jackson River Regional WWTP

Please find enclosed our second submission for our application with attachments for renewal of our VPDES Permit (#VA0090671) for the Lower Jackson River Regional Waste Water Treatment Plant (LJRRWWTP) currently under construction. All effluent analyses reported on the application is estimated from data gathered for the Clifton Forge Waste Water Treatment Plant (CFWWTP) and does not reflect the anticipated performance of the new LJRRWWTP. Following is our response to your comments received via e-mail on March 22, 2011:

1. Part A.12, must be completed using estimated data, since the waiver request was denied by EPA.

*Completed. Data reported in Part A.12 was estimated using 2010 test data from the Clifton Forge WWTP. E. Coli analysis was used in lieu of Fecal Coliform and HEM analysis was used in lieu of Oil and Grease.*

2. Part B.1, must be completed, this information may be available from preliminary engineering documents for the facility.

*Completed. 300,000 gallons per day is estimated from conditions at the CFWWTP calculated by subtracting the dry weather flow (approximately 0.7 MGD) from the 2010 average flow (approximately 1.0 MGD).*

3. Part B.2, the topographic map should show the location of the outfall. In addition, please submit a site plan showing the locations of units and other details of the plant required by B.2. An electronic map will be acceptable, a paper copy should be no larger than 11"x17".

*Completed. Please see the attached maps for the facility currently under construction. The first exhibit shows the entire plant, its outfall, and the new Iron Gate Sewer Pump Station with topography. The other six plan sheets are copies of the construction plans for the new plant. Please use these seven exhibits along with Attachment #1 from our first application submission.*

John R. Strutner, County Administrator

## BOARD OF SUPERVISORS

David P. Price  
Boiling Springs District

Suzanne T. Adcock  
Clifton Forge East District

Carolyn T. Barnette  
Clifton Forge West District

Paige R. Morgan  
Covington District

Rickey D. May  
Falling Spring District

Stephen A. Bennett  
Jackson River District

Cletus W. Nicely  
Sharon District

4. Part B.6, effluent data should be estimated. Please note how the estimate was made.

*Completed. Data reported in Part B.6 was estimated using 2010 test data from the Clifton Forge WWTP with the exception of Ammonia, Oil and Grease, and TDS which were performed in 2009. Total residual chlorine was not reported as the LJRRWWTP will use ultraviolet disinfection instead of chlorine disinfection.*

5. Part C, the certification does not appear to be made correctly. Please have the application forms signed by the principal executive officer or ranking elected official of the County.

*Completed. Mr. John R. Strutner, County Administrator, has signed the VPDES permit application.*

6. Part D, expanded effluent data should be estimated. Please note how the estimate was made.

*Completed. The expanded effluent testing data was completed using data from the CFWWTP performed in 2009. The CFWWTP currently serves and treats the same areas that the LJRRWWTP will serve.*

7. Part E, Toxicity Testing Data should be estimated. Please note how the estimate was made. The application instructions note that "...if test data have already been submitted (within the last four and one-half years) in accordance with an issued NPDES permit, the treatment works may note the dates the tests were submitted and need not fill out the information requested in question E.2 for that test."

*Completed. The toxicity testing data was estimated using tests reported for the CFWWTP on December of 2007, 2008, 2009, and 2010. Please see the attached summary table for these tests.*

8. Part E.3, please mark "yes" or "no".

*Completed.*

9. The Sewage Sludge application form should be signed by the principal executive officer or ranking elected official of the County.

*Completed. Mr. John R. Strutner, County Administrator, has signed the Sewage Sludge application.*

Please do not hesitate to call with any questions or concerns you may have.

cc:

Mr. John Strutner – County Administrator  
Mr. Jon Lanford – Assistant County Administrator  
Mr. Joe Hogan – Chief Operator, LMWWTP  
Mr. Don Hearl – ESS  
Mr. Brian White – ESS  
File

FACILITY NAME AND PERMIT NUMBER:

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086

FORM  
**2A**  
NPDES

## NPDES FORM 2A APPLICATION OVERVIEW

### APPLICATION OVERVIEW

Form 2A has been developed in a modular format and consists of a "Basic Application Information" packet and a "Supplemental Application Information" packet. The Basic Application Information packet is divided into two parts. All applicants must complete Parts A and C. Applicants with a design flow greater than or equal to 0.1 mgd must also complete Part B. Some applicants must also complete the Supplemental Application Information packet. The following items explain which parts of Form 2A you must complete.

#### BASIC APPLICATION INFORMATION:

- A. Basic Application Information for all Applicants.** All applicants must complete questions A.1 through A.8. A treatment works that discharges effluent to surface waters of the United States must also answer questions A.9 through A.12.
- B. Additional Application Information for Applicants with a Design Flow  $\geq 0.1$  mgd.** All treatment works that have design flows greater than or equal to 0.1 million gallons per day must complete questions B.1 through B.6.
- C. Certification.** All applicants must complete Part C (Certification).

#### SUPPLEMENTAL APPLICATION INFORMATION:

- D. Expanded Effluent Testing Data.** A treatment works that discharges effluent to surface waters of the United States and meets one or more of the following criteria must complete Part D (Expanded Effluent Testing Data):
  - 1. Has a design flow rate greater than or equal to 1 mgd,
  - 2. Is required to have a pretreatment program (or has one in place), or
  - 3. Is otherwise required by the permitting authority to provide the information.
- E. Toxicity Testing Data.** A treatment works that meets one or more of the following criteria must complete Part E (Toxicity Testing Data):
  - 1. Has a design flow rate greater than or equal to 1 mgd,
  - 2. Is required to have a pretreatment program (or has one in place), or
  - 3. Is otherwise required by the permitting authority to submit results of toxicity testing.
- F. Industrial User Discharges and RCRA/CERCLA Wastes.** A treatment works that accepts process wastewater from any significant industrial users (SIUs) or receives RCRA or CERCLA wastes must complete Part F (Industrial User Discharges and RCRA/CERCLA Wastes). SIUs are defined as:
  - 1. All industrial users subject to Categorical Pretreatment Standards under 40 Code of Federal Regulations (CFR) 403.6 and 40 CFR Chapter I, Subchapter N (see instructions); and
  - 2. Any other industrial user that:
    - a. Discharges an average of 25,000 gallons per day or more of process wastewater to the treatment works (with certain exclusions); or
    - b. Contributes a process wastestream that makes up 5 percent or more of the average dry weather hydraulic or organic capacity of the treatment plant; or
    - c. Is designated as an SIU by the control authority.
- G. Combined Sewer Systems.** A treatment works that has a combined sewer system must complete Part G (Combined Sewer Systems).

**ALL APPLICANTS MUST COMPLETE PART C (CERTIFICATION)**

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

## BASIC APPLICATION INFORMATION

## PART A. BASIC APPLICATION INFORMATION FOR ALL APPLICANTS:

All treatment works must complete questions A.1 through A.8 of this Basic Application Information packet.

## A.1. Facility Information.

Facility name Lower Jackson River Regional WWTPMailing Address 9212 Winerberry Avenue, Suite C  
Covington, Virginia 24426Contact person Mr. Christopher B. Clark, PETitle Director of Public Works/EngineerTelephone number (540) 863-6650Facility Address 50 Fork Farm Road (Route 727)  
(not P.O. Box) Iron Gate, Virginia 24448

## A.2. Applicant Information. If the applicant is different from the above, provide the following:

Applicant name \_\_\_\_\_

Mailing Address \_\_\_\_\_

Contact person \_\_\_\_\_

Title \_\_\_\_\_

Telephone number \_\_\_\_\_

Is the applicant the owner or operator (or both) of the treatment works?

☒ owner ☐ operator

Indicate whether correspondence regarding this permit should be directed to the facility or the applicant.

☒ facility ☐ applicant

## A.3. Existing Environmental Permits. Provide the permit number of any existing environmental permits that have been issued to the treatment works (include state-issued permits).

NPDES VA0090671

PSD \_\_\_\_\_

UIC \_\_\_\_\_

Other \_\_\_\_\_

RCRA \_\_\_\_\_

Other \_\_\_\_\_

## A.4. Collection System Information. Provide information on municipalities and areas served by the facility. Provide the name and population of each entity and, if known, provide information on the type of collection system (combined vs. separate) and its ownership (municipal, private, etc.).

Name	Population Served	Type of Collection System	Ownership
<u>Clifton Forge</u>	<u>4289</u>	<u>Separate</u>	<u>Municipal</u>
<u>Selma</u>	<u>485</u>	<u>Separate</u>	<u>Municipal</u>
<u>Iron Gate/Wesgate</u>	<u>700</u>	<u>Separate</u>	<u>Municipal</u>

Total population served See next sheet

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

 Form Approved 1/14/99  
 OMB Number 2040-0086

**BASIC APPLICATION INFORMATION**
**PART A. BASIC APPLICATION INFORMATION FOR ALL APPLICANTS:**

All treatment works must complete questions A.1 through A.8 of this Basic Application Information packet.

**A.1. Facility Information.**

Facility name \_\_\_\_\_  
 Mailing Address \_\_\_\_\_  
 \_\_\_\_\_  
 Contact person \_\_\_\_\_  
 Title \_\_\_\_\_  
 Telephone number \_\_\_\_\_  
 Facility Address \_\_\_\_\_  
 (not P.O. Box) \_\_\_\_\_

**A.2. Applicant Information.** If the applicant is different from the above, provide the following:

Applicant name \_\_\_\_\_  
 Mailing Address \_\_\_\_\_  
 \_\_\_\_\_  
 Contact person \_\_\_\_\_  
 Title \_\_\_\_\_  
 Telephone number \_\_\_\_\_

Is the applicant the owner or operator (or both) of the treatment works?

☒ owner      ☒ operator

Indicate whether correspondence regarding this permit should be directed to the facility or the applicant.

☒ facility      ☒ applicant

**A.3. Existing Environmental Permits.** Provide the permit number of any existing environmental permits that have been issued to the treatment works (include state-issued permits).

NPDES \_\_\_\_\_ PSD \_\_\_\_\_  
 UIC \_\_\_\_\_ Other \_\_\_\_\_  
 RCRA \_\_\_\_\_ Other \_\_\_\_\_

**A.4. Collection System Information.** Provide information on municipalities and areas served by the facility. Provide the name and population of each entity and, if known, provide information on the type of collection system (combined vs. separate) and its ownership (municipal, private, etc.).

Name	Population Served	Type of Collection System	Ownership
Cliftondale Park	1000	Separate	Municipal
_____	_____	_____	_____
_____	_____	_____	_____

 Total population served Approx. 6,474

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

## A.5. Indian Country.

- a. Is the treatment works located in Indian Country?

☐ Yes ☒ No

- b. Does the treatment works discharge to a receiving water that is either in Indian Country or that is upstream from (and eventually flows through) Indian Country?

☐ Yes ☒ No

## A.6. Flow. Indicate the design flow rate of the treatment plant (i.e., the wastewater flow rate that the plant was built to handle). Also provide the average daily flow rate and maximum daily flow rate for each of the last three years. Each year's data must be based on a 12-month time period with the 12th month of "this year" occurring no more than three months prior to this application submittal.

- a. Design flow rate
- 2.6
- mgd

Two Years AgoLast YearThis Year

- b. Annual average daily flow rate
- N/A
- N/A
- N/A
- mgd

- c. Maximum daily flow rate
- N/A
- N/A
- N/A
- mgd

## A.7. Collection System. Indicate the type(s) of collection system(s) used by the treatment plant. Check all that apply. Also estimate the percent contribution (by miles) of each.

☒ Separate sanitary sewer 100 %  
☐ Combined storm and sanitary sewer \_\_\_\_\_ %

## A.8. Discharges and Other Disposal Methods.

- a. Does the treatment works discharge effluent to waters of the U.S.?
- ☒
- Yes
- ☐
- No

If yes, list how many of each of the following types of discharge points the treatment works uses:

- i. Discharges of treated effluent 1  
ii. Discharges of untreated or partially treated effluent \_\_\_\_\_  
iii. Combined sewer overflow points \_\_\_\_\_  
iv. Constructed emergency overflows (prior to the headworks) \_\_\_\_\_  
v. Other \_\_\_\_\_

- b. Does the treatment works discharge effluent to basins, ponds, or other surface impoundments that do not have outlets for discharge to waters of the U.S.?
- ☐
- Yes
- ☒
- No

If yes, provide the following for each surface impoundment:

Location: \_\_\_\_\_

Annual average daily volume discharged to surface impoundment(s) \_\_\_\_\_ mgd

Is discharge \_\_\_\_\_ continuous or \_\_\_\_\_ intermittent?

- c. Does the treatment works land-apply treated wastewater?
- ☐
- Yes
- ☒
- No

If yes, provide the following for each land application site:

Location: \_\_\_\_\_

Number of acres: \_\_\_\_\_

Annual average daily volume applied to site: \_\_\_\_\_ Mgd

Is land application \_\_\_\_\_ continuous or \_\_\_\_\_ intermittent?

- d. Does the treatment works discharge or transport treated or untreated wastewater to another treatment works?
- ☐
- Yes
- ☒
- No

**FACILITY NAME AND PERMIT NUMBER:**Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

If yes, describe the mean(s) by which the wastewater from the treatment works is discharged or transported to the other treatment works (e.g., tank truck, pipe).

If transport is by a party other than the applicant, provide:

Transporter name: \_\_\_\_\_

Mailing Address: \_\_\_\_\_  
\_\_\_\_\_

Contact person: \_\_\_\_\_

Title: \_\_\_\_\_

Telephone number: \_\_\_\_\_

For each treatment works that receives this discharge, provide the following:

Name: \_\_\_\_\_

Mailing Address: \_\_\_\_\_  
\_\_\_\_\_

Contact person: \_\_\_\_\_

Title: \_\_\_\_\_

Telephone number: \_\_\_\_\_

If known, provide the NPDES permit number of the treatment works that receives this discharge. \_\_\_\_\_

Provide the average daily flow rate from the treatment works into the receiving facility. \_\_\_\_\_

mgd

- e. Does the treatment works discharge or dispose of its wastewater in a manner not included in A.8.a through A.8.d above (e.g., underground percolation, well injection)?

\_\_\_\_\_ Yes

\_\_\_\_\_ ☒ No

If yes, provide the following for each disposal method:

Description of method (including location and size of site(s) if applicable):

Annual daily volume disposed of by this method: \_\_\_\_\_

Is disposal through this method \_\_\_\_\_ continuous or \_\_\_\_\_ intermittent?



Lower Jackson River Regional WWTP - VA0090671

**WASTEWATER DISCHARGES:**

**If you answered "yes" to question A.8.a, complete questions A.9 through A.12 once for each outfall (including bypass points) through which effluent is discharged. Do not include information on combined sewer overflows in this section. If you answered "no" to question A.8.a, go to Part B, "Additional Application Information for Applicants with a Design Flow Greater than or Equal to 0.1 mgd."**

### A.9. Description of Outfall.

- a. Outfall number 1
- b. Location Iron Gate 24448  
(City or town, if applicable) (Zip Code)  
Alleghany Virginia  
(County) (State)  
37 deg. 47 min. 32 sec. 79 deg. 47 min. 4 sec.  
(Latitude) (Longitude)
- c. Distance from shore (if applicable) N/A ft.
- d. Depth below surface (if applicable) N/A ft.
- e. Average daily flow rate 2.6 mgd
- f. Does this outfall have either an intermittent or a periodic discharge? Yes ✓ No (go to A.9.g.)
- If yes, provide the following information:
- Number of times per year discharge occurs: \_\_\_\_\_
- Average duration of each discharge: \_\_\_\_\_
- Average flow per discharge: \_\_\_\_\_ mgd
- Months in which discharge occurs: \_\_\_\_\_
- g. Is outfall equipped with a diffuser? Yes ✓ No

#### A.10. Description of Receiving Waters.

- a. Name of receiving water Jackson River
- b. Name of watershed (if known) Unknown
- United States Soil Conservation Service 14-digit watershed code (if known): Unknown
- c. Name of State Management/River Basin (if known): James River, Upper
- United States Geological Survey 8-digit hydrologic cataloging unit code (if known): 02080201
- d. Critical low flow of receiving stream (if applicable):  
acute N/A cfs chronic N/A cfs
- e. Total hardness of receiving stream at critical low flow (if applicable): N/A mg/l of CaCO<sub>3</sub>

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

## A.11. Description of Treatment.

- a. What levels of treatment are provided? Check all that apply.

☐ Primary☒ Secondary☒ Advanced☐ Other. Describe: \_\_\_\_\_

- b. Indicate the following removal rates (as applicable):

Design BOD<sub>5</sub> removal or Design CBOD<sub>5</sub> removal 85 %Design SS removal 85 %Design P removal 93 %Design N removal 69 %

Other \_\_\_\_\_ %

- c. What type of disinfection is used for the effluent from this outfall? If disinfection varies by season, please describe.

Ultraviolet Disinfection

If disinfection is by chlorination, is dechlorination used for this outfall?

☐ Yes☐ No

- d. Does the treatment plant have post aeration?

☒

Yes

☐ No

**A.12. Effluent Testing Information.** All Applicants that discharge to waters of the US must provide effluent testing data for the following parameters. Provide the indicated effluent testing required by the permitting authority for each outfall through which effluent is discharged. Do not include information on combined sewer overflows in this section. All information reported must be based on data collected through analysis conducted using 40 CFR Part 136 methods. In addition, this data must comply with QA/QC requirements of 40 CFR Part 136 and other appropriate QA/QC requirements for standard methods for analytes not addressed by 40 CFR Part 136. At a minimum, effluent testing data must be based on at least three samples and must be no more than four and one-half years apart.

Outfall number: 1

PARAMETER	MAXIMUM DAILY VALUE		AVERAGE DAILY VALUE		
	Value	Units	Value	Units	Number of Samples
pH (Minimum)	6	s.u.			
pH (Maximum)	7.3	s.u.			
Flow Rate	4.19	MGD	1.02	MGD	365
Temperature (Winter)	12.6	C	8.8	C	91
Temperature (Summer)	24.2	C	22.2	C	92

\* For pH please report a minimum and a maximum daily value

POLLUTANT	MAXIMUM DAILY DISCHARGE		AVERAGE DAILY DISCHARGE			ANALYTICAL METHOD	ML / MDL
	Conc.	Units	Conc.	Units	Number of Samples		

## CONVENTIONAL AND NONCONVENTIONAL COMPOUNDS.

BIOCHEMICAL OXYGEN	BOD-5	28	mg/l	16	mg/l	365	SM 5210-A	2 mg/l
DEMAND (Report one)	CBOD-5							
FECAL COLIFORM		4	mpn	2	mpn	365	SM9221B,C,F	2 mpn
TOTAL SUSPENDED SOLIDS (TSS)		27	mg/l	12	mg/l	365	SM 2540-D	1.00 mg/l

## END OF PART A.

REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086**BASIC APPLICATION INFORMATION****PART B. ADDITIONAL APPLICATION INFORMATION FOR APPLICANTS WITH A DESIGN FLOW GREATER THAN OR EQUAL TO 0.1 MGD (100,000 gallons per day).**All applicants with a design flow rate  $\geq 0.1$  mgd must answer questions B.1 through B.6. All others go to Part C (Certification).**B.1. Inflow and Infiltration.** Estimate the average number of gallons per day that flow into the treatment works from inflow and/or infiltration.300,000 gpd

Briefly explain any steps underway or planned to minimize inflow and infiltration.

Public Works is making the necessary repairs to our collection system per our I&I study completed in 2007.**B.2. Topographic Map.** Attach to this application a topographic map of the area extending at least one mile beyond facility property boundaries. This map must show the outline of the facility and the following information. (You may submit more than one map if one map does not show the entire area.)

- The area surrounding the treatment plant, including all unit processes.
- The major pipes or other structures through which wastewater enters the treatment works and the pipes or other structures through which treated wastewater is discharged from the treatment plant. Include outfalls from bypass piping, if applicable.
- Each well where wastewater from the treatment plant is injected underground.
- Wells, springs, other surface water bodies, and drinking water wells that are: 1) within 1/4 mile of the property boundaries of the treatment works, and 2) listed in public record or otherwise known to the applicant.
- Any areas where the sewage sludge produced by the treatment works is stored, treated, or disposed.
- If the treatment works receives waste that is classified as hazardous under the Resource Conservation and Recovery Act (RCRA) by truck, rail, or special pipe, show on the map where that hazardous waste enters the treatment works and where it is treated, stored, and/or disposed.

**B.3. Process Flow Diagram or Schematic.** Provide a diagram showing the processes of the treatment plant, including all bypass piping and all backup power sources or redundancy in the system. Also provide a water balance showing all treatment units, including disinfection (e.g. chlorination and dechlorination). The water balance must show daily average flow rates at influent and discharge points and approximate daily flow rates between treatment units. Include a brief narrative description of the diagram.**B.4. Operation/Maintenance Performed by Contractor(s).**Are any operational or maintenance aspects (related to wastewater treatment and effluent quality) of the treatment works the responsibility of a contractor? ☒ Yes ☐ No

If yes, list the name, address, telephone number, and status of each contractor and describe the contractor's responsibilities (attach additional pages if necessary).

Name: Environmental Systems Service, LtdMailing Address: P.O. Box 520 Culpeper, Virginia 22701Telephone Number: (540) 825-6660Responsibilities of Contractor: As soon as construction in complete, ESS will fully operate and maintain the plant**B.5. Scheduled Improvements and Schedules of Implementation.** Provide information on any uncompleted implementation schedule or uncompleted plans for improvements that will affect the wastewater treatment, effluent quality, or design capacity of the treatment works. If the treatment works has several different implementation schedules or is planning several improvements, submit separate responses to question B.5 for each. (If none, go to question B.6.)

- List the outfall number (assigned in question A.9) for each outfall that is covered by this implementation schedule.

1

- Indicate whether the planned improvements or implementation schedule are required by local, State, or Federal agencies.

☐ Yes ☒ No

## FACILITY NAME AND PERMIT NUMBER:

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086

- c. If the answer to B.5.b is "Yes," briefly describe, including new maximum daily inflow rate (if applicable).

N/A

- d. Provide dates imposed by any compliance schedule or any actual dates of completion for the implementation steps listed below, as applicable. For improvements planned independently of local, State, or Federal agencies, indicate planned or actual completion dates, as applicable. Indicate dates as accurately as possible.

Implementation Stage	Schedule	Actual Completion
	MM / DD / YYYY	MM / DD / YYYY
- Begin construction	11 / 02 / 2009	11 / 02 / 2009
- End construction	09 / 19 / 2011	___ / ___ / ___
- Begin discharge	09 / 19 / 2011	___ / ___ / ___
- Attain operational level	10 / 31 / 2011	___ / ___ / ___

- e. Have appropriate permits/clearances concerning other Federal/State requirements been obtained? ☐ Yes ☐ No

Describe briefly: N/A

**B.6. EFFLUENT TESTING DATA (GREATER THAN 0.1 MGD ONLY).**

Applicants that discharge to waters of the US must provide effluent testing data for the following parameters. Provide the indicated effluent testing required by the permitting authority for each outfall through which effluent is discharged. Do not include information on combined sewer overflows in this section. All information reported must be based on data collected through analysis conducted using 40 CFR Part 136 methods. In addition, this data must comply with QA/QC requirements of 40 CFR Part 136 and other appropriate QA/QC requirements for standard methods for analytes not addressed by 40 CFR Part 136. At a minimum, effluent testing data must be based on at least three pollutant scans and must be no more than four and one-half years old.

Outfall Number: 1

POLLUTANT	MAXIMUM DAILY DISCHARGE		AVERAGE DAILY DISCHARGE			ANALYTICAL METHOD	ML / MDL
	Conc.	Units	Conc.	Units	Number of Samples		
CONVENTIONAL AND NONCONVENTIONAL COMPOUNDS.							
AMMONIA (as N)	1.97	mg/l	1.64	mg/l	52	SM4500-NH3	0.1 mg/l
CHLORINE (TOTAL RESIDUAL, TRC)	N/A		N/A			N/A	
DISSOLVED OXYGEN	15.8	mg/l	8.2	mg/l	365	SM4500-O	0.2 mg/l
TOTAL KJELDAHL NITROGEN (TKN)	8.6	mg/l	5	mg/l	52	SM4500-N,B	1.00 mg/l
NITRATE PLUS NITRITE NITROGEN	11.6	mg/l	6	mg/l	52	SM4500NO3	0.05 mg/l
OIL and GREASE	12.1	mg/l	3	mg/l	4	EPA1664A	5.00 mg/l
PHOSPHORUS (Total)	7.7	mg/l	2	mg/l	52	SM4500-P	0.05 mg/l
TOTAL DISSOLVED SOLIDS (TDS)	178	mg/l	163	mg/l	365	SM2540-C	1.00 mg/l
OTHER							

**END OF PART B.**

**REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE**

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086**BASIC APPLICATION INFORMATION****PART C. CERTIFICATION**

All applicants must complete the Certification Section. Refer to instructions to determine who is an officer for the purposes of this certification. All applicants must complete all applicable sections of Form 2A, as explained in the Application Overview. Indicate below which parts of Form 2A you have completed and are submitting. By signing this certification statement, applicants confirm that they have reviewed Form 2A and have completed all sections that apply to the facility for which this application is submitted.

**Indicate which parts of Form 2A you have completed and are submitting:**☒ Basic Application Information packet

Supplemental Application Information packet:

☒ Part D (Expanded Effluent Testing Data)☒ Part E (Toxicity Testing: Biomonitoring Data)☒ Part F (Industrial User Discharges and RCRA/CERCLA Wastes)☐ Part G (Combined Sewer Systems)**ALL APPLICANTS MUST COMPLETE THE FOLLOWING CERTIFICATION.**

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name and official title Mr. John R. Strutner, Alleghany County AdministratorSignature Telephone number (540) 863-6600Date signed 3-28-2011

Upon request of the permitting authority, you must submit any other information necessary to assess wastewater treatment practices at the treatment works or identify appropriate permitting requirements.

**SEND COMPLETED FORMS TO:**

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

## SUPPLEMENTAL APPLICATION INFORMATION

## PART D. EXPANDED EFFLUENT TESTING DATA

Refer to the directions on the cover page to determine whether this section applies to the treatment works.

**Effluent Testing: 1.0 mgd and Pretreatment Treatment Works.** If the treatment works has a design flow greater than or equal to 1.0 mgd or it has (or is required to have) a pretreatment program, or is otherwise required by the permitting authority to provide the data, then provide effluent testing data for the following pollutants. Provide the indicated effluent testing information and any other information required by the permitting authority for each outfall through which effluent is discharged. Do not include information on combined sewer overflows in this section. All information reported must be based on data collected through analyses conducted using 40 CFR Part 136 methods. In addition, these data must comply with QA/QC requirements of 40 CFR Part 136 and other appropriate QA/QC requirements for standard methods for analytes not addressed by 40 CFR Part 136. Indicate in the blank rows provided below any data you may have on pollutants not specifically listed in this form. At a minimum, effluent testing data must be based on at least three pollutant scans and must be no more than four and one-half years old.

Outfall number: 1 (Complete once for each outfall discharging effluent to waters of the United States.)

POLLUTANT	MAXIMUM DAILY DISCHARGE				AVERAGE DAILY DISCHARGE					ANALYTICAL METHOD	ML/ MDL
	Conc.	Units	Mass	Units	Conc.	Units	Mass	Units	Number of Samples		
METALS (TOTAL RECOVERABLE), CYANIDE, PHENOLS, AND HARDNESS.											
ANTIMONY	<.002	mg/l	0		<.002	mg/l	0		2	EPA 200.8	0.002
ARSENIC	<.003	mg/l	0		<.003	mg/l	0		2	EPA 200.8	0.003
BERYLLIUM	<.002	mg/l	0		<.002	mg/l	0		2	EPA 200.8	0.002
CADMIUM	<.005	mg/l	0		<.005	mg/l	0		2	EPA 200.8	0.005
CHROMIUM	<.005	mg/l	0		<.005	mg/l	0		2	EPA 200.8	0.005
COPPER	0.011	mg/l	.118	lb/dy	0.001	mg/l	0.09	lb/dy	2	EPA 200.8	0.005
LEAD	<.005	mg/l	0		<.005	mg/l	0		2	EPA 200.8	0.005
MERCURY	<.002	mg/l	0		<QL	mg/l	0		2	EPA 245.1	0.0002
NICKEL	<.005	mg/l	0		<.005	mg/l	0		2	EPA 200.8	0.005
SELENIUM	<.005	mg/l	0		<.005	mg/l	0		2	EPA 200.8	0.005
SILVER	<.005	mg/l	0		<.005	mg/l	0		2	EPA 200.8	0.005
THALLIUM	<.002	mg/l	0		<.002	mg/l	0		2	EPA 200.8	0.002
ZINC	0.028	mg/l	0.23	lb/dy	0.026	mg/l	0.18	lb/dy	2	EPA 200.8	0.005
CYANIDE	<.005	mg/l	0		<.005	mg/l	0		2	EPA 335.4	0.005
TOTAL PHENOLIC COMPOUNDS	<0.02	mg/l	0		<0.02	mg/l	0		2	EPA 420.4	0.02
HARDNESS (AS CaCO3)	105	mg/l	811	lb/dy	95.4	mg/l	864	lb/dy	2	SM 2340C	2

Use this space (or a separate sheet) to provide information on other metals requested by the permit writer.


## FACILITY NAME AND PERMIT NUMBER:

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086

Outfall number: 1 (Complete once for each outfall discharging effluent to waters of the United States.)

POLLUTANT	MAXIMUM DAILY DISCHARGE				AVERAGE DAILY DISCHARGE					ANALYTICAL METHOD	ML/ MDL
	Conc.	Units	Mass	Units	Conc.	Units	Mass	Units	Number of Samples		
VOLATILE ORGANIC COMPOUNDS.											
ACROLEIN	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5
ACRYLONITRILE	<50	ug/l	0		<50	ug/l	0		2	EPA 624	50
BENZENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	50
BROMOFORM	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
CARBON TETRACHLORIDE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
CLOROBENZENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
CHLORODIBROMO-METHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
CHLOROETHANE	<10	ug/l	0		<10	ug/l	0		2	EPA 624	10 ug/l
2-CHLORO-ETHYL VINYL ETHER	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
CHLOROFORM	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
DICHLOROBROMO-METHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,1-DICHLOROETHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,2-DICHLOROETHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
TRANS-1,2-DICHLORO-ETHYLENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,1-DICHLOROETHYLENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,2-DICHLOROPROPANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,3-DICHLORO-PROPYLENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
ETHYLBENZENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
METHYL BROMIDE	<10	ug/l	0		<10	ug/l	0		2	EPA 624	10 ug/l
METHYL CHLORIDE	<10	ug/l	0		<10	ug/l	0		2	EPA 624	10 ug/l
METHYLENE CHLORIDE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,1,2,2-TETRACHLORO-ETHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
TETRACHLORO-ETHYLENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
TOLUENE	6	ug/l	46.3	lb/dy	3	ug/l	23.1	lb/dy	2	EPA 624	5 ug/l

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

 Form Approved 1/14/99  
 OMB Number 2040-0086

 Outfall number: 1 (Complete once for each outfall discharging effluent to waters of the United States.)

POLLUTANT	MAXIMUM DAILY DISCHARGE				AVERAGE DAILY DISCHARGE					ANALYTICAL METHOD	ML/ MDL
	Conc.	Units	Mass	Units	Conc.	Units	Mass	Units	Number of Samples		
1,1,1-TRICHLOROETHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,1,2-TRICHLOROETHANE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
TRICHLORETHYLENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
VINYL CHLORIDE	<10	ug/l	0		<10	ug/l	0		2	EPA 624	10 ug/l

Use this space (or a separate sheet) to provide information on other volatile organic compounds requested by the permit writer.

--	--	--	--	--	--	--	--	--	--	--	--

**ACID-EXTRACTABLE COMPOUNDS**

P-CHLORO-M-CRESOL	<20	ug/l	0		<20	ug/l	0		2	EPA 625	20 ug/l
2-CHLOROPHENOL	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
2,4-DICHLOROPHENOL	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
2,4-DIMETHYLPHENOL	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
4,6-DINITRO-O-CRESOL	<50	ug/l	0		<50	ug/l	0		2	EPA 625	50 ug/l
2,4-DINITROPHENOL	<50	ug/l	0		<50	ug/l	0		2	EPA 625	50 ug/l
2-NITROPHENOL	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
4-NITROPHENOL	<50	ug/l	0		<50	ug/l	0		2	EPA 625	50 ug/l
PENTACHLOROPHENOL	<50	ug/l	0		<50	ug/l	0		2	EPA 625	50 ug/l
PHENOL	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
2,4,6-TRICHLOROPHENOL	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l

Use this space (or a separate sheet) to provide information on other acid-extractable compounds requested by the permit writer.

--	--	--	--	--	--	--	--	--	--	--	--

**BASE-NEUTRAL COMPOUNDS.**

ACENAPHTHENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
ACENAPHTHYLENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
ANTHRACENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BENZIDINE	<20	ug/l	0		<20	ug/l	0		2	EPA 625	20 ug/l
BENZO(A)ANTHRACENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BENZO(A)PYRENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l



**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

 Form Approved 1/14/99  
 OMB Number 2040-0086

 Outfall number: 1 (Complete once for each outfall discharging effluent to waters of the United States.)

POLLUTANT	MAXIMUM DAILY DISCHARGE				AVERAGE DAILY DISCHARGE					ANALYTICAL METHOD	ML/ MDL
	Conc.	Units	Mass	Units	Conc.	Units	Mass	Units	Number of Samples		
3,4 BENZO-FLUORANTHENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BENZO(GH)PERYLENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BENZO(K)FLUORANTHENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BIS (2-CHLOROETHOXY) METHANE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BIS (2-CHLOROETHYL)-ETHER	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BIS (2-CHLOROISO-PROPYL) ETHER	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BIS (2-ETHYLHEXYL) PHTHALATE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
4-BROMOPHENYL PHENYL ETHER	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
BUTYL BENZYL PHTHALATE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
2-CHLORONAPHTHALENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
4-CHLORPHENYL PHENYL ETHER	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
CHRYSENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
DI-N-BUTYL PHTHALATE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
DI-N-OCTYL PHTHALATE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
DIBENZO(A,H) ANTHRACENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
1,2-DICHLOROBENZENE	<5	ug/l	0		<5	ug/l	0		2	EPA 624	5 ug/l
1,3-DICHLOROBENZENE	<5	ug/l	0		<5	ug/l	0		2	EPA 625	5 ug/l
1,4-DICHLOROBENZENE	<5	ug/l	0		<5	ug/l	0		2	EPA 625	5 ug/l
3,3-DICHLOROBENZIDINE	<20	ug/l	0		<20	ug/l	0		2	EPA 625	20 ug/l
DIETHYL PHTHALATE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
DIMETHYL PHTHALATE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
2,4-DINITROTOLUENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
2,6-DINITROTOLUENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
1,2-DIPHENYLHYDRAZINE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086Outfall number: 1 (Complete once for each outfall discharging effluent to waters of the United States.)

POLLUTANT	MAXIMUM DAILY DISCHARGE				AVERAGE DAILY DISCHARGE					ANALYTICAL METHOD	ML/ MDL
	Conc.	Units	Mass	Units	Conc.	Units	Mass	Units	Number of Samples		
FLUORANTHENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
FLUORENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
HEXACHLOROBENZENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
HEXACHLOROBUTADIENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
HEXACHLOROCYCLO-PENTADIENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
HEXACHLOROETHANE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
INDENO(1,2,3-CD)PYRENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
ISOPHORONE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
NAPHTHALENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
NITROBENZENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
N-NITROSODI-N-PROPYLAMINE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
N-NITROSODI- METHYLAMINE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
N-NITROSODI-PHENYLAMINE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
PHENANTHRENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
PYRENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l
1,2,4-TRICHLOROBENZENE	<10	ug/l	0		<10	ug/l	0		2	EPA 625	10 ug/l

Use this space (or a separate sheet) to provide information on other base-neutral compounds requested by the permit writer.

Use this space (or a separate sheet) to provide information on other pollutants (e.g., pesticides) requested by the permit writer.

**END OF PART D.**  
**REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE**

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

## SUPPLEMENTAL APPLICATION INFORMATION

## PART E. TOXICITY TESTING DATA

POTWs meeting one or more of the following criteria must provide the results of whole effluent toxicity tests for acute or chronic toxicity for each of the facility's discharge points: 1) POTWs with a design flow rate greater than or equal to 1.0 mgd; 2) POTWs with a pretreatment program (or those that are required to have one under 40 CFR Part 403); or 3) POTWs required by the permitting authority to submit data for these parameters.

- At a minimum, these results must include quarterly testing for a 12-month period within the past 1 year using multiple species (minimum of two species), or the results from four tests performed at least annually in the four and one-half years prior to the application, provided the results show no appreciable toxicity, and testing for acute and/or chronic toxicity, depending on the range of receiving water dilution. Do not include information on combined sewer overflows in this section. All information reported must be based on data collected through analysis conducted using 40 CFR Part 136 methods. In addition, this data must comply with QA/QC requirements of 40 CFR Part 136 and other appropriate QA/QC requirements for standard methods for analytes not addressed by 40 CFR Part 136.
- In addition, submit the results of any other whole effluent toxicity tests from the past four and one-half years. If a whole effluent toxicity test conducted during the past four and one-half years revealed toxicity, provide any information on the cause of the toxicity or any results of a toxicity reduction evaluation, if one was conducted.
- If you have already submitted any of the information requested in Part E, you need not submit it again. Rather, provide the information requested in question E.4 for previously submitted information. If EPA methods were not used, report the reasons for using alternate methods. If test summaries are available that contain all of the information requested below, they may be submitted in place of Part E.

If no biomonitoring data is required, do not complete Part E. Refer to the Application Overview for directions on which other sections of the form to complete.

## E.1. Required Tests.

Indicate the number of whole effluent toxicity tests conducted in the past four and one-half years.

☒ chronic ☒ acute

**E.2. Individual Test Data.** Complete the following chart for each whole effluent toxicity test conducted in the last four and one-half years. Allow one column per test (where each species constitutes a test). Copy this page if more than three tests are being reported.

Test number: \_\_\_\_\_ Test number: \_\_\_\_\_ Test number: \_\_\_\_\_

## a. Test information.

Test species & test method number			
Age at initiation of test			
Outfall number			
Dates sample collected			
Date test started			
Duration			

## b. Give toxicity test methods followed.

Manual title			
Edition number and year of publication			
Page number(s)			

## c. Give the sample collection method(s) used. For multiple grab samples, indicate the number of grab samples used.

24-Hour composite			
Grab			

## d. Indicate where the sample was taken in relation to disinfection. (Check all that apply for each)

Before disinfection			
After disinfection			
After dechlorination			

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

Test number: \_\_\_\_\_

Test number: \_\_\_\_\_

Test number: \_\_\_\_\_

e. Describe the point in the treatment process at which the sample was collected.

Sample was collected:

f. For each test, include whether the test was intended to assess chronic toxicity, acute toxicity, or both.

Chronic toxicity

Acute toxicity

g. Provide the type of test performed.

Static

Static-renewal

Flow-through

h. Source of dilution water. If laboratory water, specify type; if receiving water, specify source.

Laboratory water

Receiving water

i. Type of dilution water. If salt water, specify "natural" or type of artificial sea salts or brine used.

Fresh water

Salt water

j. Give the percentage effluent used for all concentrations in the test series.



k. Parameters measured during the test. (State whether parameter meets test method specifications)

pH

Salinity

Temperature

Ammonia

Dissolved oxygen

## I. Test Results.

Acute:

Percent survival in 100% effluent

%

%

%

LC<sub>50</sub>

95% C.I.

%

%

%

Control percent survival

%

%

%

Other (describe)

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086

Chronic:

NOEC	%	%	%
IC <sub>25</sub>	%	%	%
Control percent survival	%	%	%
Other (describe)			

m. Quality Control/Quality Assurance.

Is reference toxicant data available?			
Was reference toxicant test within acceptable bounds?			
What date was reference toxicant test run (MM/DD/YYYY)?			
Other (describe)			

**E.3. Toxicity Reduction Evaluation.** Is the treatment works involved in a Toxicity Reduction Evaluation?

☐ Yes ☒ No      If yes, describe: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

**E.4. Summary of Submitted Biomonitoring Test Information.** If you have submitted biomonitoring test information, or information regarding the cause of toxicity, within the past four and one-half years, provide the dates the information was submitted to the permitting authority and a summary of the results.

Date submitted: \_\_\_\_\_ (MM/DD/YYYY)

Summary of results: (see instructions)

Results submitted 12/07, 12/08, 12/09, 12/10. See attached summary table.  
\_\_\_\_\_**END OF PART E.****REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE.**

## FACILITY NAME AND PERMIT NUMBER:

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

## SUPPLEMENTAL APPLICATION INFORMATION

## PART F. INDUSTRIAL USER DISCHARGES AND RCRA/CERCLA WASTES

All treatment works receiving discharges from significant industrial users or which receive RCRA, CERCLA, or other remedial wastes must complete Part F.

## GENERAL INFORMATION:

F.1. Pretreatment Program. Does the treatment works have, or is it subject to, an approved pretreatment program?

☐ Yes ☒ No

F.2. Number of Significant Industrial Users (SIUs) and Categorical Industrial Users (CIUs). Provide the number of each of the following types of industrial users that discharge to the treatment works.

a. Number of non-categorical SIUs. 0

b. Number of CIUs. 0

## SIGNIFICANT INDUSTRIAL USER INFORMATION:

Supply the following information for each SIU. If more than one SIU discharges to the treatment works, copy questions F.3 through F.8 and provide the information requested for each SIU.

F.3. Significant Industrial User Information. Provide the name and address of each SIU discharging to the treatment works. Submit additional pages as necessary.

Name: N/A as Parker Hannifin Powertrain has closed down its business in Iron Gate

Mailing Address:

F.4. Industrial Processes. Describe all of the industrial processes that affect or contribute to the SIU's discharge.

F.5. Principal Product(s) and Raw Material(s). Describe all of the principal processes and raw materials that affect or contribute to the SIU's discharge.

Principal product(s):

Raw material(s):

F.6. Flow Rate.

a. Process wastewater flow rate. Indicate the average daily volume of process wastewater discharged into the collection system in gallons per day (gpd) and whether the discharge is continuous or intermittent.

\_\_\_\_\_ gpd (\_\_\_\_ continuous or \_\_\_\_ intermittent)

b. Non-process wastewater flow rate. Indicate the average daily volume of non-process wastewater flow discharged into the collection system in gallons per day (gpd) and whether the discharge is continuous or intermittent.

\_\_\_\_\_ gpd (\_\_\_\_ continuous or \_\_\_\_ intermittent)

F.7. Pretreatment Standards. Indicate whether the SIU is subject to the following:

a. Local limits \_\_\_\_\_ Yes \_\_\_\_\_ No

b. Categorical pretreatment standards \_\_\_\_\_ Yes \_\_\_\_\_ No

If subject to categorical pretreatment standards, which category and subcategory?

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

Form Approved 1/14/99  
OMB Number 2040-0086

**F.8. Problems at the Treatment Works Attributed to Waste Discharged by the SIU.** Has the SIU caused or contributed to any problems (e.g., upsets, interference) at the treatment works in the past three years?

☐ Yes ☒ No If yes, describe each episode.

\_\_\_\_\_  
\_\_\_\_\_

**RCRA HAZARDOUS WASTE RECEIVED BY TRUCK, RAIL, OR DEDICATED PIPELINE:**

**F.9. RCRA Waste.** Does the treatment works receive or has it in the past three years received RCRA hazardous waste by truck, rail, or dedicated pipe? ☐ Yes ☒ No (go to F.12.)

**F.10. Waste Transport.** Method by which RCRA waste is received (check all that apply):

☐ Truck ☐ Rail ☐ Dedicated Pipe

**F.11. Waste Description.** Give EPA hazardous waste number and amount (volume or mass, specify units).

EPA Hazardous Waste Number

Amount

Units

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

**CERCLA (SUPERFUND) WASTEWATER, RCRA REMEDIATION/CORRECTIVE ACTION WASTEWATER, AND OTHER REMEDIAL ACTIVITY WASTEWATER:**

**F.12. Remediation Waste.** Does the treatment works currently (or has it been notified that it will) receive waste from remedial activities?

☐ Yes (complete F.13 through F.15.) ☒ No

Provide a list of sites and the requested information (F.13 - F.15.) for each current and future site.

**F.13. Waste Origin.** Describe the site and type of facility at which the CERCLA/RCRA/or other remedial waste originates (or is expected to originate in the next five years).

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

**F.14. Pollutants.** List the hazardous constituents that are received (or are expected to be received). Include data on volume and concentration, if known. (Attach additional sheets if necessary).

\_\_\_\_\_  
\_\_\_\_\_

**F.15. Waste Treatment.**

a. Is this waste treated (or will it be treated) prior to entering the treatment works?

☐ Yes ☐ No

If yes, describe the treatment (provide information about the removal efficiency):

\_\_\_\_\_  
\_\_\_\_\_

b. Is the discharge (or will the discharge be) continuous or intermittent?

☐ Continuous ☐ Intermittent If intermittent, describe discharge schedule.

\_\_\_\_\_

**END OF PART F.**

**REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE**

**FACILITY NAME AND PERMIT NUMBER:**

Lower Jackson River Regional WWTP - VA0090671

 Form Approved 1/14/99  
 OMB Number 2040-0086

**SUPPLEMENTAL APPLICATION INFORMATION**
**PART G. COMBINED SEWER SYSTEMS**

If the treatment works has a combined sewer system, complete Part G.

**G.1. System Map.** Provide a map indicating the following: (may be included with Basic Application Information)

- a. All CSO discharge points.
- b. Sensitive use areas potentially affected by CSOs (e.g., beaches, drinking water supplies, shellfish beds, sensitive aquatic ecosystems, and outstanding natural resource waters).
- c. Waters that support threatened and endangered species potentially affected by CSOs.

**G.2. System Diagram.** Provide a diagram, either in the map provided in G.1. or on a separate drawing, of the combined sewer collection system that includes the following information:

- a. Locations of major sewer trunk lines, both combined and separate sanitary.
- b. Locations of points where separate sanitary sewers feed into the combined sewer system.
- c. Locations of in-line and off-line storage structures.
- d. Locations of flow-regulating devices.
- e. Locations of pump stations.

**CSO OUTFALLS:**

Complete questions G.3 through G.6 once for each CSO discharge point.

**G.3. Description of Outfall.**

- a. Outfall number \_\_\_\_\_
- b. Location \_\_\_\_\_  
 (City or town, if applicable) \_\_\_\_\_ (Zip Code) \_\_\_\_\_  
 \_\_\_\_\_  
 (County) \_\_\_\_\_ (State) \_\_\_\_\_  
 \_\_\_\_\_  
 (Latitude) \_\_\_\_\_ (Longitude) \_\_\_\_\_
- c. Distance from shore (if applicable) \_\_\_\_\_ ft.
- d. Depth below surface (if applicable) \_\_\_\_\_ ft.
- e. Which of the following were monitored during the last year for this CSO?  
 \_\_\_\_\_ Rainfall \_\_\_\_\_ CSO pollutant concentrations \_\_\_\_\_ CSO frequency  
 \_\_\_\_\_ CSO flow volume \_\_\_\_\_ Receiving water quality
- f. How many storm events were monitored during the last year? \_\_\_\_\_

**G.4. CSO Events.**

- a. Give the number of CSO events in the last year.  
 \_\_\_\_\_ events (\_\_\_\_ actual or \_\_\_\_ approx.)
- b. Give the average duration per CSO event.  
 \_\_\_\_\_ hours (\_\_\_\_ actual or \_\_\_\_ approx.)



**FACILITY NAME AND PERMIT NUMBER:**

Form Approved 1/14/99  
OMB Number 2040-0086

Lower Jackson River Regional WWTP - VA0090671

- c. Give the average volume per CSO event.

\_\_\_\_\_ million gallons (\_\_\_\_\_ actual or \_\_\_\_\_ approx.)

- d. Give the minimum rainfall that caused a CSO event in the last year.

\_\_\_\_\_ inches of rainfall

**G.5. Description of Receiving Waters.**

- a. Name of receiving water: \_\_\_\_\_

- b. Name of watershed/river/stream system: \_\_\_\_\_

United States Soil Conservation Service 14-digit watershed code (if known): \_\_\_\_\_

- c. Name of State Management/River Basin: \_\_\_\_\_

United States Geological Survey 8-digit hydrologic cataloging unit code (if known): \_\_\_\_\_

**G.6. CSO Operations.**

Describe any known water quality impacts on the receiving water caused by this CSO (e.g., permanent or intermittent beach closings, permanent or intermittent shell fish bed closings, fish kills, fish advisories, other recreational loss, or violation of any applicable State water quality standard).

\_\_\_\_\_  
\_\_\_\_\_

**END OF PART G.**

**REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE.**

Additional information, if provided, will appear on the following pages.

## VPDES SEWAGE SLUDGE PERMIT APPLICATION FORM

## SCREENING INFORMATION

This application is divided into sections. Sections A pertain to all applicants. The applicability of Sections B, C and D depend on your facility's sewage sludge use or disposal practices. The information provided on this page will help you determine which sections to fill out.

1. All applicants must complete Section A (General Information).

2. Does this facility generate sewage sludge? ☒ Yes ☐ No

Does this facility derive a material from sewage sludge? ☐ Yes ☒ No

If you answered Yes to either, complete Section B (Generation Of Sewage Sludge Or Preparation Of A Material Derived From Sewage Sludge).

3. Does this facility apply sewage sludge to the land? ☐ Yes ☒ No

Is sewage sludge from this facility applied to the land? ☐ Yes ☒ No

If you answer No to all above, skip Section C.

If you answered Yes to either, answer the following three questions:

a. Does the sewage sludge from this facility meet the ceiling concentrations, pollutant concentrations, Class A pathogen reduction requirements and one of the vector attraction reduction requirements 1-8, as identified in the instructions?

☐ Yes ☐ No

b. Is sewage sludge from this facility placed in a bag or other container for sale or give-away for application to the land? ☐ Yes ☐ No

c. Is sewage sludge from this facility sent to another facility for treatment or blending? ☐ Yes ☐ No

If you answered No to all three, complete Section C (Land Application Of Bulk Sewage Sludge).

If you answered Yes to a, b or c, skip Section C.

4. Do you own or operate a surface disposal site? ☐ Yes ☒ No

If Yes, complete Section D (Surface Disposal).

## SECTION A. GENERAL INFORMATION

All applicants must complete this section.

1. Facility Information.
  - a. Facility name: Lower Jackson River Regional WWTP
  - b. Contact person: Christopher B. Clark, PE  
Title: Director of Public Works/Engineer  
Phone: (540) 863-6650
  - c. Mailing address:  
Street or P.O. Box: 9212 Winterberry Ave., Suite C  
City or Town: Covington State: Virginia Zip: 24426
  - d. Facility location:  
Street or Route #: 50 Fork Farm Road (Route 727)  
County: Alleghany County  
City or Town: Iron Gate State: Virginia Zip: 24448
  - e. Is this facility a Class I sludge management facility? ☐ Yes ☒ No
  - f. Facility design flow rate: 2.6 mgd
  - g. Total population served: Approx. 6474
  - h. Indicate the type of facility:  
☒ Publicly owned treatment works (POTW)  
☐ Privately owned treatment works  
☐ Federally owned treatment works  
☐ Blending or treatment operation  
☐ Surface disposal site  
☐ Other (describe):
2. Applicant Information. If the applicant is different from the above, provide the following:
  - a. Applicant name:
  - b. Mailing address:  
Street or P.O. Box:  
City or Town: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_
  - c. Contact person:  
Title:  
Phone: ( ) \_\_\_\_\_
  - d. Is the applicant the owner or operator (or both) of this facility?  
☐ owner ☐ operator
  - d. Should correspondence regarding this permit be directed to the facility or the applicant?  
☐ facility ☐ applicant
3. Permit Information.
  - a. Facility's VPDES permit number (if applicable): VA0090671
  - b. List on this form or an attachment, all other federal, state or local permits or construction approvals received or applied for that regulate this facility's sewage sludge management practices:  
Permit Number: \_\_\_\_\_ Type of Permit: \_\_\_\_\_  
N/A
4. Indian Country. Does any generation, treatment, storage, application to land or disposal of sewage sludge from this facility occur in Indian Country? ☐ Yes ☒ No If yes, describe:

5. Topographic Map. Provide a topographic map or maps (or other appropriate maps if a topographic map is unavailable) that shows the following information. Maps should include the area one mile beyond all property boundaries of the facility:
- Location of all sewage sludge management facilities, including locations where sewage sludge is generated, stored, treated, or disposed.
  - Location of all wells, springs, and other surface water bodies listed in public records or otherwise known to the applicant within 1/4 mile of the property boundaries. PLEASE SEE ATTACHMENT 1
6. Line Drawing. Provide a line drawing and/or a narrative description that identifies all sewage sludge processes that will be employed during the term of the permit including all processes used for collecting, dewatering, storing, or treating sewage sludge, the destination(s) of all liquids and solids leaving each unit, and all methods used for pathogen reduction and vector attraction reduction. PLEASE SEE ATTACHMENT 2
7. Contractor Information. Are any operational or maintenance aspects of this facility related to sewage sludge generation, treatment, use or disposal the responsibility of a contractor? X Yes    No  
If yes, provide the following for each contractor (attach additional pages if necessary).  
Name: Thompson Trucking, Inc.  
Mailing address:  
Street or P.O. Box: P.O. Box 969  
City or Town: Concord State: Virginia Zip: 24538  
Phone: (434) 993-2195  
Contractor's Federal, State or Local Permit Number(s) applicable to this facility's sewage sludge: DOT#263863
- If the contractor is responsible for the use and/or disposal of the sewage sludge, provide a description of the service to be provided to the applicant and the respective obligations of the applicant and the contractor(s).
8. Pollutant Concentrations. Using the table below or a separate attachment, provide sewage sludge monitoring data for the pollutants which limits in sewage sludge have been established in 9 VAC 25-31-10 et seq. for this facility's expected use or disposal practices. All data must be based on three or more samples taken at least one month apart and must be no more than four and one-half years old. N/A

POLLUTANT	CONCENTRATION (mg/kg dry weight)	SAMPLE DATE	ANALYTICAL METHOD	DETECTION LEVEL FOR ANALYSIS
Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				

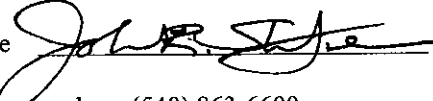
9. Certification. Read and submit the following certification statement with this application. Refer to the instructions to determine who is an officer for purposes of this certification. Indicate which parts of the application you have completed and are submitting:
- X   Section A (General Information)  
  X   Section B (Generation of Sewage Sludge or Preparation of a Material Derived from Sewage Sludge)  
       Section C (Land Application of Bulk Sewage Sludge)  
       Section D (Surface Disposal)

**FACILITY NAME: Lower Jackson River Regional WWTP**

**VPDES PERMIT NUMBER: VA0090671**

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name and official title: Mr. John R. Strutner, Alleghany County Administrator

Signature  Date Signed 3-28-2011

Telephone number: (540) 863-6600

Upon request of the department, you must submit any other information necessary to assess sewage sludge use or disposal practices at your facility or identify appropriate permitting requirements.

**SECTION B. GENERATION OF SEWAGE SLUDGE OR PREPARATION  
OF A MATERIAL DERIVED FROM SEWAGE SLUDGE**

Complete this section if your facility generates sewage sludge or derives a material from sewage sludge

1. Amount Generated On Site.  
Total dry metric tons per 365-day period generated at your facility: Approx. 484 dry metric tons
2. Amount Received from Off Site. If your facility receives sewage sludge from another facility for treatment, use or disposal, provide the following information for each facility from which sewage sludge is received. If you receive sewage sludge from more than one facility, attach additional pages as necessary. N/A
  - a. Facility name:
  - b. Contact Person:  
Title:  
Phone ( )
  - c. Mailing address:  
Street or P.O. Box:  
City or Town: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_
  - d. Facility Address:  
(not P.O. Box)
  - e. Total dry metric tons per 365-day period received from this facility: \_\_\_\_\_ dry metric tons
  - f. Describe, on this form or on another sheet of paper, any treatment processes known to occur at the off-site facility, including blending activities and treatment to reduce pathogens or vector attraction characteristics:
3. Treatment Provided at Your Facility.
  - a. Which class of pathogen reduction is achieved for the sewage sludge at your facility?  
Class A Class B X Neither or unknown
  - b. Describe, on this form or another sheet of paper, any treatment processes used at your facility to reduce pathogens in sewage sludge: Aerobic Digestion (Sludge)
  - c. Which vector attraction reduction option is met for the sewage sludge at your facility?  
Option 1 (Minimum 38 percent reduction in volatile solids)  
Option 2 (Anaerobic process, with bench-scale demonstration)  
Option 3 (Aerobic process, with bench-scale demonstration)  
Option 4 (Specific oxygen uptake rate for aerobically digested sludge)  
Option 5 (Aerobic processes plus raised temperature)  
Option 6 (Raise pH to 12 and retain at 11.5)  
Option 7 (75 percent solids with no unstabilized solids)  
Option 8 (90 percent solids with unstabilized solids)  
X None or unknown
  - d. Describe, on this form or another sheet of paper, any treatment processes used at your facility to reduce vector attraction properties of sewage sludge: Aerobic Digestion
  - e. Describe, on this form or another sheet of paper, any other sewage sludge treatment activities, including blending, not identified in a - d above: Sludge processed with rotary fan press
4. Preparation of Sewage Sludge Meeting Ceiling and Pollutant Concentrations, Class A Pathogen Requirements and One of Vector Attraction Reduction Options 1-8 (EQ Sludge).  
(If sewage sludge from your facility does not meet all of these criteria, skip Question 4.)
  - a. Total dry metric tons per 365-day period of sewage sludge subject to this section that is applied to the land:  
\_\_\_\_\_ dry metric tons
  - b. Is sewage sludge subject to this section placed in bags or other containers for sale or give-away?  
Yes No

## 5. Sale or Give-Away in a Bag or Other Container for Application to the Land.

(Complete this question if you place sewage sludge in a bag or other container for sale or give-away prior to land application. Skip this question if sewage sludge is covered in Question 4.) N/A

- a. Total dry metric tons per 365-day period of sewage sludge placed in a bag or other container at your facility for sale or give-away for application to the land: \_\_\_\_\_ dry metric tons
- b. Attach, with this application, a copy of all labels or notices that accompany the sewage sludge being sold or given away in a bag or other container for application to the land.

6. Shipment Off Site for Treatment or Blending. N/A

(Complete this question if sewage sludge from your facility is sent to another facility that provides treatment or blending. This question does not apply to sewage sludge sent directly to a land application or surface disposal site. Skip this question if the sewage sludge is covered in Questions 4 or 5. If you send sewage sludge to more than one facility, attach additional sheets as necessary.)

- a. Receiving facility name:
- b. Facility contact:  
Title:  
Phone: (    )
- c. Mailing address:  
Street or P.O. Box:  
City or Town: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_
- d. Total dry metric tons per 365-day period of sewage sludge provided to receiving facility: \_\_\_\_\_ dry metric tons
- e. List, on this form or an attachment, the receiving facility's VPDES permit number as well as the numbers of all other federal, state or local permits that regulate the receiving facility's sewage sludge use or disposal practices:  
Permit Number: \_\_\_\_\_ Type of Permit: \_\_\_\_\_  
\_\_\_\_\_

- f. Does the receiving facility provide additional treatment to reduce pathogens in sewage sludge from your facility?    Yes    No

Which class of pathogen reduction is achieved for the sewage sludge at the receiving facility?

   Class A    Class B    Neither or unknown

Describe, on this form or another sheet of paper, any treatment processes used at the receiving facility to reduce pathogens in sewage sludge:

- g. Does the receiving facility provide additional treatment to reduce vector attraction characteristics of the sewage sludge?    Yes    No

Which vector attraction reduction option is met for the sewage sludge at the receiving facility?

- Option 1 (Minimum 38 percent reduction in volatile solids)  
   Option 2 (Anaerobic process, with bench-scale demonstration)  
   Option 3 (Aerobic process, with bench-scale demonstration)  
   Option 4 (Specific oxygen uptake rate for aerobically digested sludge)  
   Option 5 (Aerobic processes plus raised temperature)  
   Option 6 (Raise pH to 12 and retain at 11.5)  
   Option 7 (75 percent solids with no unstabilized solids)  
   Option 8 (90 percent solids with unstabilized solids)  
   None unknown

Describe, on this form or another sheet of paper, any treatment processes used at the receiving facility to reduce vector attraction properties of sewage sludge:

- h. Does the receiving facility provide any additional treatment or blending not identified in f or g above?  
   Yes    No

If yes, describe, on this form or another sheet of paper, the treatment processes not identified in f or g above:

- i. If you answered yes to f., g or h above, attach a copy of any information you provide to the receiving facility to comply with the "notice and necessary information" requirement of 9 VAC 25-31-530.G.



- j. Does the receiving facility place sewage sludge from your facility in a bag or other container for sale or give-away for application to the land? ☐ Yes ☐ No  
If yes, provide a copy of all labels or notices that accompany the product being sold or given away.
- k. Will the sewage sludge be transported to the receiving facility in a truck-mounted watertight tank normally used for such purposes? ☐ Yes ☐ No. If no, provide description and specification on the vehicle used to transport the sewage sludge to the receiving facility.  
Show the haul route(s) on a location map or briefly describe the haul route below and indicate the days of the week and the times of the day sewage sludge will be transported.

7. Land Application of Bulk Sewage Sludge. **N/A**

(Complete Question 7.a if sewage sludge from your facility is applied to the land, unless the sewage sludge is covered in Questions 4, 5 or 6; complete Question 7.b, c & d only if you are responsible for land application of sewage sludge.)

- a. Total dry metric tons per 365-day period of sewage sludge applied to all land application sites: \_\_\_\_\_ dry metric tons
- b. Do you identify all land application sites in Section C of this application? ☐ Yes ☐ No  
If no, submit a copy of the Land Application Plan (LAP) with this application (LAP should be prepared in accordance with the instructions).
- c. Are any land application sites located in States other than Virginia? ☐ Yes ☐ No  
If yes, describe, on this form or on another sheet of paper, how you notify the permitting authority for the States where the land application sites are located. Provide a copy of the notification.
- d. Attach a copy of any information you provide to the owner or lease holder of the land application sites to comply with the "notice and necessary" information requirement of 9 VAC 25-31-530 F and/or H (Examples may be obtained in Appendix IV).

8. Surface Disposal. **N/A**

(Complete Question 8 if sewage sludge from your facility is placed on a surface disposal site.)

- a. Total dry metric tons per 365-day period of sewage sludge from your facility placed on all surface disposal sites: \_\_\_\_\_ dry metric tons
- b. Do you own or operate all surface disposal sites to which you send sewage sludge for disposal?  
☐ Yes ☐ No  
If no, answer questions c - g for each surface disposal site that you do not own or operate. If you send sewage sludge to more than one surface disposal site, attach additional pages as necessary.
- c. Site name or number:
- d. Contact person:  
Title:  
Phone: (    )  
Contact is: ☐ Site Owner ☐ Site operator
- e. Mailing address.  
Street or P.O. Box:  
City or Town: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_
- f. Total dry metric tons per 365-day period of sewage sludge from your facility placed on this surface disposal site: \_\_\_\_\_ dry metric tons
- g. List, on this form or an attachment, the surface disposal site VPDES permit number as well as the numbers of all other federal, state or local permits that regulate the sewage sludge use or disposal practices at the surface disposal site:  

<u>Permit Number:</u>	<u>Type of Permit:</u>
_____	_____
_____	_____

9. Incineration. **N/A**

(Complete Question 9 if sewage sludge from your facility is fired in a sewage sludge incinerator.)

- a. Total dry metric tons per 365-day period of sewage sludge from your facility fired in a sewage sludge incinerator: \_\_\_\_\_ dry metric tons

- b. Do you own or operate all sewage sludge incinerators in which sewage sludge from your facility is fired?  
     Yes      No  
If no, answer questions c - g for each sewage sludge incinerator that you do not own or operate. If you send sewage sludge to more than one sewage sludge incinerator, attach additional pages as necessary.
- c. Incinerator name or number:
- d. Contact person:  
Title:  
Phone: (    )  
Contact is:      Incinerator Owner      Incinerator Operator
- e. Mailing address.  
Street or P.O. Box:  
City or Town:                                  State:                  Zip:
- f. Total dry metric tons per 365-day period of sewage sludge from your facility fired in this sewage sludge incinerator:                                  dry metric tons
- g. List on this form or an attachment the numbers of all other federal, state or local permits that regulate the firing of sewage sludge at this incinerator:  
Permit Number:                                  Type of Permit:

## 10. Disposal in a Municipal Solid Waste Landfill.

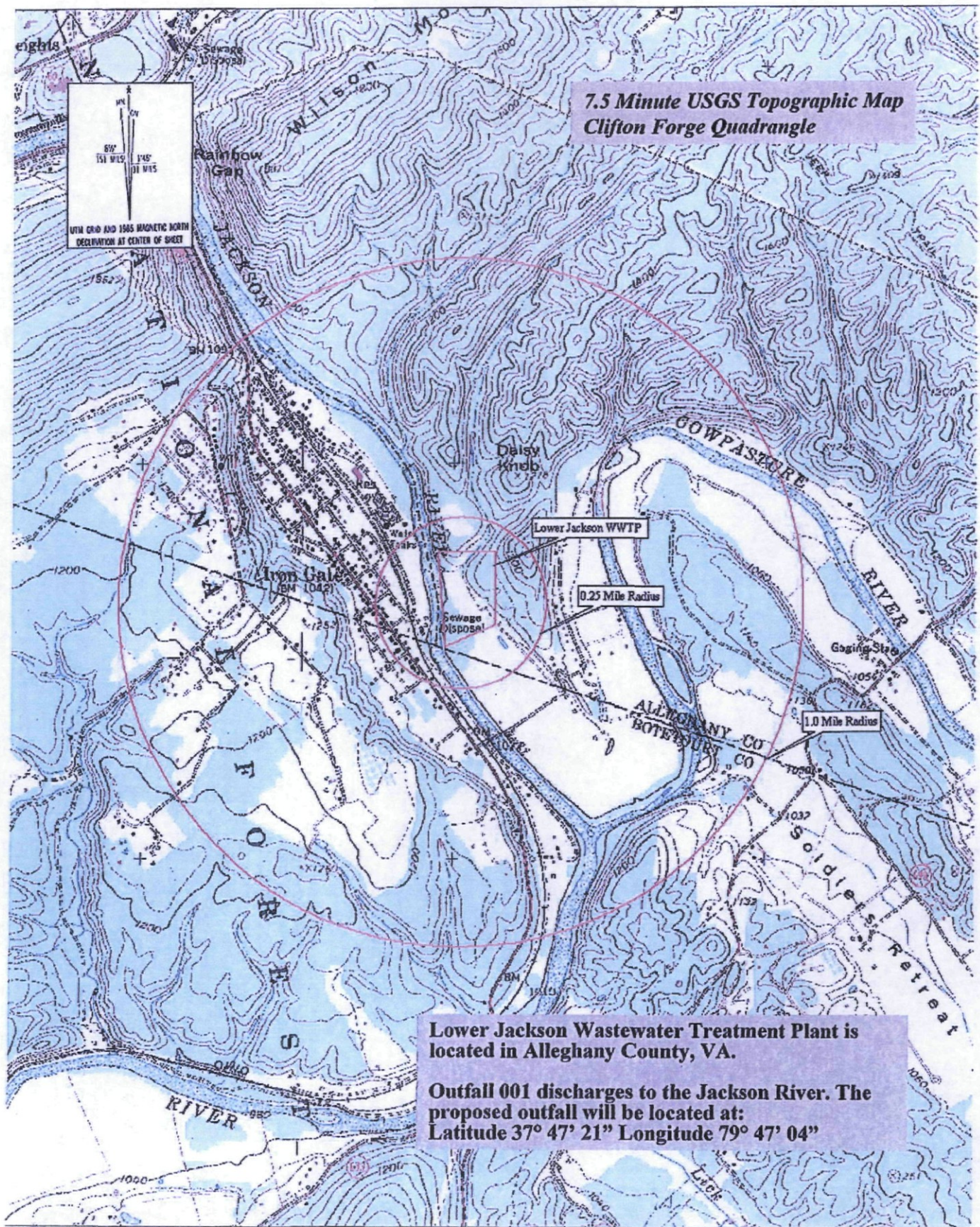
(Complete Question 10 if sewage sludge from your facility is placed on a municipal solid waste landfill. Provide the following information for each municipal solid waste landfill on which sewage sludge from your facility is placed. If sewage sludge is placed on more than one municipal solid waste landfill, attach additional pages as necessary.)

- a. Landfill name: Amelia Landfill
- b. Contact person: Tom Foley  
Title: Industrial Account Manager  
Phone: (804) 512-7800  
Contact is:   X   Landfill Owner   X   Landfill Operator
- c. Mailing address.  
Street or P.O. Box: P.O. Box 168  
City or Town: Amelia State: Virginia Zip: 23002
- d. Landfill location.  
Street or Route #: 20221 Maplewood Road  
County: Amelia  
City or Town: Jetersville State: Virginia Zip: 23083
- e. Total dry metric tons per 365-day period of sewage sludge placed in this municipal solid waste landfill:  
Approx. 484 dry metric tons
- f. List, on this form or an attachment, the numbers of all federal, state or local permits that regulate the operation of this municipal solid waste landfill:  
Permit Number:                                  Type of Permit:                                   
#540 Solid Waste Permit
- g. Does sewage sludge meet applicable requirements in the Virginia Solid Waste Management Regulation, 9 VAC 20-80-10 et seq., concerning the quality of materials disposed in a municipal solid waste landfill?  
  X   Yes      No
- h. Does the municipal solid waste landfill comply with all applicable criteria set forth in the Virginia Solid Waste Management Regulation, 9 VAC 20-80-10 et seq.?   X   Yes      No
- i. Will the vehicle bed or other container used to transport sewage sludge to the municipal solid waste landfill be watertight and covered?   X   Yes      No  
Show the haul route(s) on a location map or briefly describe the route below and indicate the days of the week and time of the day sewage sludge will be transported. PLEASE SEE ATTACHMENT 3

**Lower Jackson River Regional WWTP #VA0090671**  
**Summary of Toxicity Testing**  
**Form 2A Part E.4**

<b>Acute Toxicity Testing</b>				
	<b>2010</b>	<b>2009</b>	<b>2008</b>	<b>2007</b>
Outfall	.001	.001	.001	.001
Sample Collection Dates	10/17 - 10/21/10	11/15 - 11/19/09	10/26 - 10/31/08	10/28 - 11/01/07
Testing Dates	10/20 - 10/22/10	11/18 - 11/20/09	10/29 - 10/31/08	10/31 - 11/02/07
Analytical Method	EPA 2000.0	EPA 2000.0	EPA 2000.0	EPA 2000.0
Result Summary	LC50 > 100%	LC50 > 100%	LC50 > 100%	LC50 > 100%
Results Submitted	Dec-10	Dec-09	Dec-08	Dec-07
<b>Chronic Toxicity</b>				
Outfall	.001	.001	0.001	
Sample Collection Dates	10/17 - 10/21/10	11/15 - 11/19/09	10/26 - 10/31/08	10/28 - 11/01/07
Testing Dates	10/19 - 10/26/10	11/17 - 11/24/09	10/28 - 11/4/08	10/30 - 11/06/07
Analytical Method	EPA 1000.0	EPA 1000.0	EPA 1000.0	EPA 1000.0
Result Summary	NOEC (S) = 100 NOEC (G) = 52%	NOEC (S) = 100 NOEC (G) = 100%	NOEC (S) = 100 NOEC (G) = 52%	NOEC (S) = 100% NOEC (G) = 52%
Results Submitted	Dec-10	Dec-09	Dec-08	Dec-07

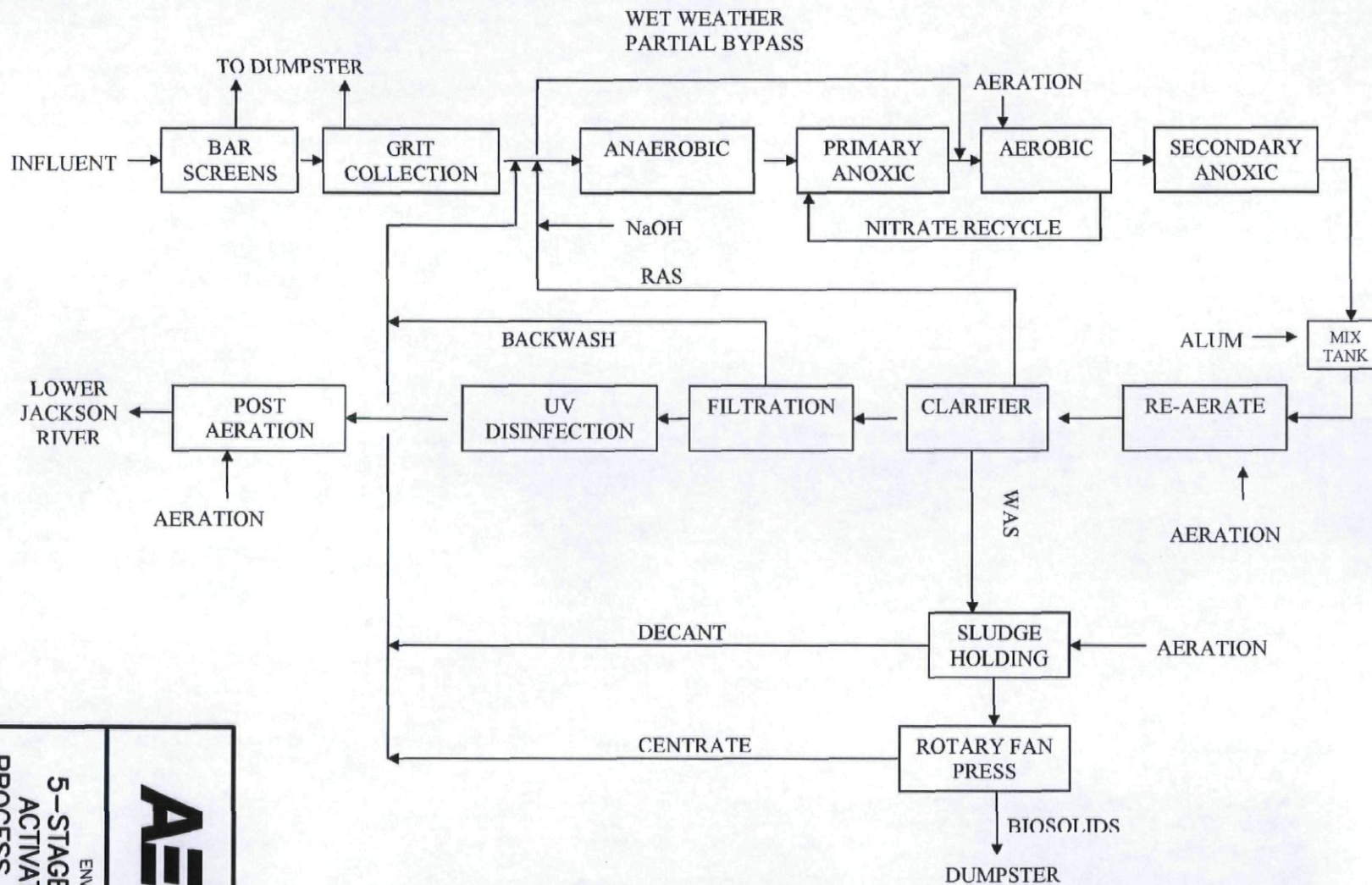




D TopoQuads Copyright © 1999 DeLorme Yarmouth, ME 04096 Source Data: USGS

700 ft Scale: 1:24,000 Detail: 13:1 Datum: WGS84





ATTACHMENT #2

LOWER JACKSON RIVER REGIONAL WWTB- 2.6 MGD

**AECOM**

ENVIRONMENTAL

5-STAGE BARDENPHO

ACTIVATED SLUDGE

PROCESS FLOW DIAGRAM

ALLEGANY COUNTY, VIRGINIA

MARCH 2011

60186P

FIG.5



ATTACHMENT #3



Directions to Maplewood Rd, Jetersville, VA


23083

152 mi – about 3 hours 4 mins


Sludge Hauling Route from Lower Jackson River Regional WWTP  
to the Amelia Landfill located at 20221 Maplewood Road, Jetersville, VA  
23083





 50 Fork Farm Rd, Fincastle, VA 24085

1. Head **southwest** on **Fork Farm Rd/State Route 727** go 0.2 mi  
total 0.2 mi
-  2. Turn left at **US-220 S/Botetourt Rd**  
Continue to follow US-220 S go 31.6 mi  
total 31.7 mi  
About 52 mins
-  3. Continue onto **US-220 Alt S/Roanoke Rd**  
Continue to follow US-220 Alt S go 5.2 mi  
total 37.0 mi  
About 7 mins
-  4. Turn left at **US-221 N/US-460 E/Challenger Ave NE**  
Continue to follow US-221 N/US-460 E go 21.0 mi  
total 58.0 mi  
About 22 mins
-  5. Slight right at **US-460 E/US-460 Bypass E**  
Continue to follow US-460 E go 79.7 mi  
total 138 mi  
About 1 hour 23 mins
-  6. Turn left at **VA-307 E** go 9.3 mi  
total 147 mi  
About 12 mins
-  7. Turn left at **US-360 E/Patrick Henry Hwy** go 4.1 mi  
total 151 mi  
About 6 mins
-  8. Turn right at **Maplewood Rd** go 0.5 mi  
total 152 mi  
About 1 min

 Maplewood Rd, Jetersville, VA 23083

These directions are for planning purposes only. You may find that construction projects, traffic, weather, or other events may cause conditions to differ from the map results, and you should plan your route accordingly. You must obey all signs or notices regarding your route.

Map data ©2011 Google

Directions weren't right? Please find your route on [maps.google.com](http://maps.google.com) and click "Report a problem" at the bottom left.